## PROTECTING WATER QUALITY

Forests provide many benefits, not the least of which is clean water. Forests filter rain and melting snow, and allow water to slowly soak into the soil or gently flow overland into lakes and streams. One of the most important and fragile areas of any forest are its riparian areas.

A riparian area is the area of land and water forming a transition from aquatic to terrestrial ecosystems along streams, lakes and open water wetlands. Riparian areas are among the most important and diverse parts of forest ecosystems. They support high soil moisture and a diverse association of plants and animals, and perform important ecological functions that link aquatic and terrestrial ecosystems.

Riparian management zones help to protect these areas by filtering sediment and nutrients from runoff which allows water to soak into the ground. Riparian vegetation can help to stabilize streambanks and lakeshores and reduce soil erosion because their roots hold the soil together, making it more difficult for waves, currents, and runoff to wash the soil away. Trees shade streams – keeping the water from becoming too warm for aquatic life in the summer.

What can you do to protect these areas?

Use the least disruptive methods possible in or around water and the adjacent riparian areas. Think twice before using mechanical methods that disturb the soil. Also, be very careful when using pesticides in riparian areas to insure these chemicals do not get into the water.

- Become familiar with Wisconsin's Forestry Best Management Practices for Water Quality. Forest management activities, especially harvesting timber, have the potential to directly impact water quality by washing exposed soils and waste products into lakes, streams, and wetlands. Following these guidelines can help you protect the water quality on your property.
- Find out if you need a permit for any forest management activity near a lake, stream or wetland. Examples of management activities that may require permits include:
  - Stream Crossings
  - Grading
  - Management Activities in a Wetland or Floodplain
  - Timber Harvesting in a Riparian Zone
  - Prescribed Burning

These are some simple things that you can do to protect and enhance the quality of the water resource in and around your woodland. To learn more about protecting water resources on your property, we recommend reading Wisconsin Forest Management Guidelines — Chapter 5, Riparian Areas and Wetlands and Wisconsin's Forestry Best Management Practices (BMPs) for Water Quality.

"One of the most important and fragile areas of any forest are its riparian areas."